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STATE OF MICHIGAN  
DEPARTMENT OF LICENSING AND REGULATORY AFFAIRS  
MICHIGAN OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION  
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MIOSHA GENERAL INDUSTRY SAFETY STANDARD  
PART 62 PLASTIC MOLDING  
ADVISORY COMMITTEE MEETING

March, 17, 2014 – 9:00 a.m.  
State Secondary Complex, 7150 Harris Drive, Lansing, Michigan, 48909  
General Office Building, Conference Room B

**MEETING MINUTES**

**ADVISORY COMMITTEE MEMBERS PRESENT:**

Bradley Lawrence .....Hi-Tech Mold & Engineering  
Andrew Comai .....UAW  
Mark Stratton .....Lacks Enterprises, Inc  
William “Lonny” Sumpter.....Inergy Automotive  
Gary Kaminski .....Cascade Engineering  
Timothy Koury.....Blue Water Safety Consultants

**MIOSHA STAFF PRESENT:**

Bart Pickelman .....MIOSHA Deputy Director  
Ron Ray .....MIOSHA Technical Services Division Director  
Dan Dykstra .....Regulatory Services Section Program Manager  
Adrian Rocskay.....General Industry Safety & Health Division Director  
Robin Spaulding.....General Industry Safety & Health Division Manager  
Jeff Kelley .....Consultation Education & Training Division Safety Consultant  
Toscha Densmore.....Regulatory Services Section Secretary  
Amber Sweeney .....General Industry Safety & Health Division Analyst

**Call to Order**

The March 17, 2014 General Industry Safety Standard Part 62 Plastic Molding, (GI Part 62), advisory committee meeting was called to order by Regulatory Services Section Manager Dan Dykstra at 9:05am. A quorum of advisory committee members was present.

Introductions of the advisory committee members and MIOSHA staff were made.

**Advisory Committee member duties, responsibilities and policies – Dan Dykstra**

Mr. Dykstra provided a quick review of the Department of Licensing and Regulatory Affairs – Code of Conduct and the Conflict of Interest Policy for Boards, Commissions, Agencies, Authorities and Committees. Mr. Dykstra also explained the travel

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reimbursement process and notified the committee members if they wanted to be reimbursed for mileage, to please take a moment after the meeting to fill out the necessary paperwork.

Mr. Dykstra pointed out that the goal of this meeting is to provide input and recommendations on Rule 6234 (10) of the standard in regards to modifying the rule, keeping the rule as it stands, or eliminating the rule.

**Introduction of issue – Bart Pickelman**

MIOSHA Deputy Director Bart Pickelman welcomed the advisory committee members and thanked them for assisting with the committee.

Mr. Pickelman provided a brief explanation of the standard promulgation process. In the past MIOSHA had three standard setting commissions, the General Industry Safety Standard Commission, the Construction Safety Standard Commission, and the Occupational Health Standard Commission. The commission members were comprised of representation from management, labor, and public and were appointed by the Governor. The standard commissions would form an advisory committee, such as the one today, whose members were knowledgeable and had experience on the subject matter. The advisory committees would draft rule language and submit to the commissions for approval. In 2012, legislation was passed that eliminated the three commissions from the MIOASH Act. MIOSHA has continued use of the advisory committees, and this is the second committee to convene. MIOSHA will continue to use advisory committees for rule promulgation and other activities. Any recommendations from the advisory committees will be presented to the Agency for consideration.

Mr. Pickelman provided some background on the GI Part 62 standard. The original standard was filed with the Secretary of State in 1973, it was amended in 1983, 1992, and 2000. In 1993 OSHA promulgated the lockout/tagout standard and MIOSHA adopted that in 1994. When the lockout/tagout standard was developed, the plastic industry did not recognize the economic impact it would have on certain production operations such as mold changes. The new standard reportedly increased the time needed to change a mold drastically. One of the issues was the amount of time it takes to bring machines and plastic resin back up to the proper temperature, after the heating elements were shut down during full lockout procedures. Another issue was the need to reprogram the logic controller after the loss of power for the mold change. Due to the burdensome nature of the lockout/tagout standard, it was found that many companies were ignoring the new standard during mold changes. To address the potential risk to employees during these mold changes, MIOSHA decided to work with the plastic industry to find a solution to protect Michigan workers. Changing the lockout/tagout standard was not an option, so MIOSHA made changes to GI Part 62 to accomplish the goal. The GI part 62 advisory committee was formed and met six times from July of 1997 through September of 1998. The alternate procedures were developed and accepted by the General Industry Safety Commission and public hearings were conducted in August of 1999. The current standard became effective in early 2000. Due to technological advances in the industry that provide for separate energy isolating devices allowing power to be maintained to the heating elements and the computer controls while locking out the power to other equipment that exposed employees to a hazard, OSHA has requested that MIOSHA conduct a review of the alternate procedures of GI Part 62 to

ensure they are up to date with the knowledge and understanding of most current industry practices in guarding methods. Therefore, MIOSHA has convened this advisory committee to evaluate if the alternate procedures are currently being utilized in the industry or if there are new advances in the industry that are technologically and economically feasible that would allow compliance with the full lockout/tagout standard, allowing for the removal of the alternate procedures of GI Part 62.

**Review input received to date – Adrian Rocskay**

Mr. Adrian Rocskay read over the rule that is under review for effectiveness, 408.16234 (10). This rule refers back to sub rules (2), (9) and (3)(a).

Mr. Rocskay stated that the General Industry Safety & Health Division mailed out approximately 100 surveys to the plastics industry in regards to the mold change procedures on horizontal plastic injection molding machines. It is estimated that those that responded to the survey represent about 10% of the industry in Michigan. Only 6 surveys were returned undeliverable out of 100 that were mailed. A total of 30 responses were received including those from the online survey.

Mr. Rocskay went over some of the results of the survey. Approximately 75% of those that responded to the survey use the alternate procedure of the rule. The average amount of machines of those surveyed is 30. Question number 13 of the survey asked the industry to provide a cost estimate for rewiring a machine and the response from the industry had a very wide range in cost, as low as \$150 each to as high as \$80,000+. It is unknown if the amounts include down time, employees cost, and wiring, or just the rewiring. Mr. Rocskay did speak to an OSHA expert, who estimated the cost to rewire machines at \$200 each.

Mr. Timothy Koury asked when the surveys were mailed out, who were they addressed to? Was it to the company name or to the owner? He believes the reason for the low number in responses is that the survey did not get to the correct person within the company. It was suggested future mailings should be addressed to the Human Resource Director. Mr. Koury also had concerns that without knowing who at the establishment actually filled out the survey, the answers provided to MIOSHA may not be accurate.

Mr. Andrew Comai asked Mr. Rocskay how many surveys were mailed out. There were 100 surveys mailed out and out of those, 21 responded, 6 were returned as undeliverable and only 8 actually had horizontal plastic injection molding machines.

**Committee member discussion**

Mr. Bradley Lawrence asked when did the mold manufacturers have to start putting in lockouts on the machines. Mr. Pickelman stated the federal standard went into effect in 1993 for lockout/tagout and all federal states follow the lockout/tagout standard. Michigan is the only state that has its own alternate procedures. Mr. Lawrence stated his establishment, Hi-Tech Mold & Engineering, has three machines with the lockout already installed and wondered if the manufacturers have changed the machinery over the years.

Mr. Lonny Sumpter pointed out that other countries have stronger requirements. He feels that the industry has caught up to technology, and that MIOSHA no longer needs to keep this rule.

Mr. Koury stated he feels the rule should be modified to allow machines manufactured during a certain time frame to follow this rule, and those after such time frame not to as they should be manufactured to meet the current requirements. He pointed out that the manufacturers should be able to provide dates to when they produced each model. It was suggested that MIOSHA could ask SPI (Society of the Plastics Industries) to send out a survey to the machine manufacturers on our behalf and see if we get a better response. The SPI was part of a national alliance with federal OSHA at the time. He feels this would be an excellent time to put this alliance to use and help solve this issue.

Mr. Lawrence asked if we have any data on injuries that occurred due to mold changes. Mr. Rocskay stated we have data on fatalities, but do not on injuries. Mr. Rocskay pointed out that since the procedures went into effect, no fatalities have been reported due to using the alternate procedures. Per Mr. Rocskay, MIOSHA has contacted SPI on several occasions and an invitation was offered to attend the meeting today.

Mr. Pickelman asked the committee members how many machines each of their facilities have.

Mr. Gary Kaminski stated his establishment, Cascade Engineering, has done a retro to their machines to a motor start lockout at the control panel. The newer machines they have now mainly come from Europe and some from within the United States, the motor start lockout is already on them so they do not have to modify. All staff gets their own "red lock". Mr. Pickelman asked the estimated cost per machine to do the retro fit. Mr. Kaminski stated he was provided the amount of \$2500 per machine. They currently have 51 machines. Mr. Rocskay asked if they had a breakdown of that cost, such as labor, lost production time, etc. Mr. Kaminski did not have that information available.

Mr. Mark Stratton stated that his employer, Lacks Enterprises, Inc., has 25 facilities with about 115 molding machines. Lacks enforces the full lockout of their machines. Mr. Stratton feels the alternative is just as good, but Lacks did not want to ever risk putting someone in any harms way so they choose to abide by the full lockout/tagout standard. Maintenance at Lacks estimated about \$200 for each machine to retrofit. They do not have many new machines and the bulk of their machines are VanDorns & Cincinnati. Each employee has their own tags with their picture on it, and each machine has step by step instructions on how to lockout.

Mr. Sumpter stated his employer, Inergy Automotive, has machines from the early 1990's to current. Their procedure is when entering safety cage, lockout all sources of energy. When setting a mold, they do it from outside of cage. Mr. Sumpter feels some companies do not test their system before going in, because they do not know how to test to ensure it is safe. With today's technology, Mr. Sumpter believes a PLC will assist. He knows it is not cheap to update their machines.

Mr. Stratton feels if the alternate procedure is just as safe as full lockout, why do we need to change or remove this rule? There have been no fatalities since this alternate procedure, so it shows it works.

Mr. Comai mentioned they have had a few fatalities in other states, where full lockout/tagout was supposed to be followed and had they done testing, they would have known the bypass would not work.

Mr. Stratton mentioned the employees at his establishment are provided special gloves and face shield to wear to protect against heat and any splatter if they have to enter the machines.

Mr. Pickelman inquired about the committee members that have facilities outside of Michigan, on how do they comply in the other states? Mr. Sumpter stated they have isolated circuits. Mr. Lawrence stated they follow the lockout/tagout standard. He believes that if we eliminate the MIOSHA alternate procedure and go with OSHA on the lockout/tagout standard, we need to have more education and enforcement. Mr. Rocskay emphasizes the use of the MIOSHA Consultation Education and Training Division when new procedures are enforced. Mr. Pickelman pointed out if we eliminate, we could do it in phases.

Mr. Koury pointed out that not every company buys brand new machines, so smaller companies may not be up to date and may not be following all the rules.

**Public appearance requests**

None

**Public Comment**

None

**Committee Recommendation**

Mr. Pickelman asked the committee do we need to find the date that ANSI mandated the extra controls to help form a recommendation on how to move forward with the rule under review?

Mr. Koury feels the committee needs to find out when manufacturers started making the changes and then modify the rule to state machines from this date and prior are allowed to follow this rule, and those from this date and after must follow the lockout/tagout standard of OSHA. More of a phase out of the current MIOSHA rule.

Mr. Lawrence feels we need to research ANSI to determine if they required compliance by a certain date.

Mr. Stratton feels it should be left up to each business owner to ensure their employees are safe. He believes if the current rule is working, why do we need to make any changes.

Mr. Pickelman pointed out with the updated technologies, OSHA wants MIOSHA to review the rule to see if we are indeed protecting our employees. OSHA would like us to reconsider our rule and to eliminate the rule as it is not believed to be as effective as the lockout standard.

Mr. Sumpter suggests MIOSHA use a grandfather type system and eventually a phase out process.

The committee held more conversation on some of the processes they see being conducted in regards to lockout and tagout.

Mr. Pickelman stated it appears the committee is not at a point of giving a recommendation to the agency in regards to the rule. He asked what other information the committee needs to formulate the recommendation. If MIOSHA did some research for dates for a possible phase out process, drafted some potential language, we could reconvene at a future date to obtain a recommendation.

Mr. Koury recommends that MIOSHA contact SPI and see if we can get information from them and to see if they will work with MIOSHA to update the rule(s). Mr. Koury feels that SPI would be able get the answers that are needed to move forward.

Mr. Pickelman again summarized what he sees as needed for the committee to make a recommendation. MIOSHA will obtain information on when ANSI started to require the separation of the heat and controller from the power, contact SPI and others to get costs estimates to retrofit older machines, and draft some language for potentially phasing out the rule over time. Mr. Pickelman asked if anyone had any other suggestions on who to check with besides SPI. It was suggested to check with the manufacturers.

It is requested that as information is provided/received by any member of the committee it be shared with Mr. Robin Spaulding, and that the information be shared with all members.

Mr. Lawrence expressed concern over doing a phase out process, and what would that mean if a machine is received from overseas or a company purchases used machines? Mr. Jeff Kelly advises that the industry would need to meet our requirements.

Mr. Koury asked that MIOSHA try to obtain some statistical data from OSHA on whether other states are locking out the machinery.

### **Adjournment**

With no further business before the advisory committee, the meeting was adjourned at 11:30.